## What is claimed is:

- 1. An isolated nucleic acid encoding a protein comprising an amino acid sequence selected from the group consisting of SEQ ID NO:14, SEQ ID NO:16, SEQ ID NO: 18, SEQ ID NO:22, SEQ ID NO:24, and SEQ ID NO:26.
- 2. The nucleic acid of claim 1, wherein the nucleic acid has a sequence selected from the group consisting of SEQ ID NO:13, SEQ ID NO:15, SEQ ID NO:17, SEQ ID NO:21, SEQ ID NO:23, SEQ ID NO:25, SEQ ID NO:27, and SEQ ID NO:28.
- 15 3. The nucleic acid of claim 1, wherein the nucleic acid is DNA or RNA.
  - 4. The nucleic acid of claim 3, wherein the DNA is cDNA.

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A nucleic acid probe of at least about 15 nucleotides in length which specifically hybridizes with a nucleic acid encoding a mammalian LOX-1 receptor or with a nucleic acid having the complementary sequence thereof.

- 6. The nucleic acid probe of claim 5, wherein the mammalian LOX-1 receptor has an amino acid sequence selected from the group consisting of SEQ ID NO:14, SEQ ID NO:16, SEQ ID NO: 18, SEQ ID NO:22, SEQ ID NO:24, and SEQ ID NO:26.
  - 7. The nucleic acid probe of claim 5, wherein the probe specifically hybridizes with a nucleic acid encoding the amino acid sequence shown in SEQ ID NO:39.
    - 8. The nucleic acid probe of claim 5, wherein the probe

is labeled with a detectable marker.

- 9. An isolated protein comprising an amino acid sequence selected from the group consisting of SEQ ID NO:14, SEQ ID NO:16, SEQ ID NO: 18, SEQ ID NO:22, SEQ ID NO:24, and SEQ ID NO:26.
  - 10. A vector compresing the nucleic acid of claim 1.
- 10 11. The vector of claim 10, wherein the vector is adapted for expression of the nucleic acid in a cell and comprises regulatory elements necessary for expression of the nucleic acid in the cell operatively linked to the nucleic acid so as to permit expression thereof.
  - 12. A cell comprising the vector of claim 10.
  - 13. The cell of claim 12 wherein the cell is a bacterial, amphibian, yeast, fungal, insect, plant, or mammalian cell.
  - 14. The cell of claim 12, wherein but for the vector present therein, the cell would not express a mammalian LOX-1 receptor.
  - 15. A method of determining whether an agent inhibits the activity of a membrane-bound mammalian LOX-1 receptor, which comprises (a) contacting the agent with the receptor under conditions which would permit the inhibition of such activity by an activity-inhibiting agent, and (b) detecting whether the agent has inhibited the activity of the LOX-1 receptor.
  - 16. The method of claim 15, wherein the LOX-1 receptor is a mouse receptor

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- 17. The method of claim 15, wherein the LOX-1 receptor is a human receptor.
- 18. An agent determined by the method of claim 15 to inhibit the activity of a membrane-bound mammalian LOX-1 receptor.
  - 19. A composition which comprises the agent of claim 18 and a pharmaceutically acceptable carrier.
  - 20. A method of preparing a composition which comprises identifying an agent by the method of claim 15, recovering the agent free of LOX-1 receptor, and admixing the agent with a pharmaceutically acceptable carrier.
  - 21. A method of inhibiting the activity of a mammalian LOX-1 receptor, which comprises contacting the receptor with an agent that inhibits the activity of a mammalian LOX-1 receptor.
  - 22. The method of claim 21, wherein the LOX-1 receptor is membrane-bound.
- 23. A method of reducing the amount of a mammalian LOX-1 receptor on the surface of a cell, which comprises delivering to the cell an agent that reduces the expression of mammalian LOX-1 receptor therein.
- 30 24. The method of claim 23, wherein the agent is a catalytic nucleic acid or an antisense nucleic acid.
- 25. A method of inhibiting the ability of an agent to bind to and activate a membrane-bound mammalian LOX
  1 receptor, which comprises contacting the agent with a soluble mammalian LOX-1 receptor.

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- 26. A method of treating a mammalian subject afflicted with a disorder selected from the group consisting of atherosclerosis, heart failure and stroke, comprising administering to the subject a therapeutically effective amount of an agent that inhibits the activity of LOX-1 receptors in the subject.
- 27. A method of inhibiting the onset in a mammalian subject of a disorder selected from the group consisting of atherosclerosis, heart failure and stroke, comprising administering to the subject a prophylactically effective amount of an agent that inhibits the activity of LOX-1 receptors in the subject.
  - 28. A method of treating a mammalian subject afflicted with a disorder selected from the group consisting of atherosclerosis, heart failure and stroke, comprising administering to the subject a therapeutically effective amount of an agent that inhibits the expression of LOX-1 receptors in the subject's cells. A
- 29. A method of inhibiting the onset in a mammalian subject of a disorder selected from the group consisting of atheroscierosis, heart failure and stroke, comprising administering to the subject a prophylactically effective amount of an agent that inhibits the expression of LOX-1 receptors in the subject's cells.
- 30. A method of treating a mammalian subject afflicted with a disorder selected from the group consisting of atherosclerosis, heart failure and stroke, comprising administering to the subject a therapeutically effective amount of a soluble LOX-1

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recept or.

- 31. A method of inhibiting the onset in a mammalian subject of a disorder selected from the group consisting of atherosclerosis, heart failure and stroke, comprising administering to the subject a prophylactically effective amount of a soluble LOX-1 receptor.
- 10 32. The method of claim 26, 27, 28, 29, 30, or 31, wherein the disorder is atherosclerosis.
  - 33. The method of claim 26, 27, 28, 29, 30, or 31, wherein the disorder is heart failure.
  - The method of claim 26, 27, 28, 29, 30, or 31, wherein the disorder is stroke.
  - 35. The method of claim 26, 27, 28, 29, 30, or 31, wherein the subject is a mouse.
    - 36. The method of claim 26, 27, 28, 29, 30, or 31,  $^{\wedge}$  wherein the subject is a human.

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